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09/991,566	11/20/2001	Stephen R. Bacso	1028-010US01	3490
2352 7590 04/06/2007 OSTROLENK FABER GERB & SOFFEN 1180 AVENUE OF THE AMERICAS NEW YORK, NY 100368403			EXAMINER HOSSAIN, FARZANA E	

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2623	

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

<b>Office Action Summary</b>	<b>Application No.</b>	<b>Applicant(s)</b>	
	09/991,566	BACSO ET AL.	
	<b>Examiner</b>	<b>Art Unit</b>	
	Farzana E. Hossain	2623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 18 January 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-53 is/are pending in the application.
- 4a) Of the above claim(s) 41-47 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-40 and 48-53 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 18 January 2007 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- ☒ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |  |   |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                     | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Response to Amendment***

1. This office action is in response to communications filed 01/18/2007. Claims 1, 2, 5, 6, 9, 12-17, 20, 25, 33, 36, 48 and 49 are amended. Claims 3, 4, 7, 8, 10, 11, 18, 19, 21-24, 26-32, 34-40 and 50-53 are previously presented. Claims 41-47 are withdrawn.

### ***Response to Arguments***

2. Applicant's arguments filed 1/18/2007 have been fully considered but they are not persuasive.

The applicant argues that Zigmond does not disclose receiving and storing characteristics of a viewer (Pages 22-23). The applicant further points out that viewer or user characteristics are determined outside of the receiver/set top box and even outside of the head-end citing sections in the specification and an example (Page 22). The applicant further points sections of Zigmond, which disclose viewer and system information that is stored in the storage location (Page 23). The applicant discloses that the Zigmond does not teach, disclose or suggest "receiving and storing characteristics of a viewer, the content, and viewing opportunities" or "performing an opportunity matching process to determine which of the accessible and permitted versions of the

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content match the viewer, viewing opportunity and content characteristics” for claims 48 and 49 (Page 23).

In response to the arguments, Zigmond discloses ad selection criteria including ad selection rules and advertisement parameters target the appropriate segment of the viewing population and the ad selection rules and advertisement parameters may be predefined by advertisers, video programming content provider or a third party operator and the viewer receives and stores the ad selection rules and advertisement parameters which are used to match the viewer and system information (Column 10, 36-67, Column 11, lines 1-55, Column 12, lines 15-32, Column 13, lines 48-47, Figure 5, 83). The examiner would like to point out that these sections of Zigmond (Column 11, lines 31-49, Column 12, lines 15-32, Figure 5, 83) were cited to in the last office action for viewer and user characteristics not the sections cited by the applicant. The examiner would also like to point out that the current claim limitations clearly can read on the system and viewer information as the receiver receives and stores characteristics of a viewer as there is no additional limitation that these characteristics are to be received from a third party. Also, the applicant does not point to a section for the example given in the applicant's specification. The examiner would like to point out that the claim limitation is “receiving and storing characteristics of a viewer” and the applicant's example of a customer list merged with the head-end in order to select address of viewers. The applicant should amend the claim limitations if the applicant wants language that has been argued in the remarks to be searched and considered. Zigmond discloses receiving ad selection criteria with ad selection rules and

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advertisement parameters that are used to match specific viewers from viewer information, which describes the viewers' characteristics (Column 11, lines 31-49, Column 12, lines 15-32, Column 13, lines 48-87, Figure 5, 83).

Zigmond also discloses receiving and storing characteristics the content (Column 12, lines 15-32, Figure 5, 83) and viewing opportunities (Column 12, lines 44-67, Column 13, lines 1-6, Figure 5, 83, Column 11, lines 13-30). Zigmond discloses performing an opportunity matching process to determine which of the accessible and permitted versions of the content match the viewer, viewing opportunity and content characteristics as the ad selection criteria is used to match content to the viewer and viewing opportunities and content characteristics (Column 9, lines 26-0, Column 10, lines 48-67, Column 11, lines 13-19, 32-65, Column 13, lines 7-39, 48-58, Figure 6, 110).

3. Regarding Claims 50-53, the applicant argues that Zigmond does not teach "sending to a plurality of receivers operated by the individual users, a plurality of versions of content, content characters each of the versions of content, display opportunities describing when each of the versions of content is to be presented, and user characteristics describing users to whom each of the versions of content is to be presented" (Page 23).

In response to the arguments, Zigmond discloses sending to a plurality of receivers operated by the individual users (Figure 1, Column 7, lines 50-61), a plurality of versions of content, content characteristics describing each of the versions of

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content, display opportunities describing when each of the versions of content is to be presented (Column 11, lines 31-65, Column 12, lines 44-67, Column 13, lines 1-6, 48-57), and user characteristics describing users to whom each of the versions is to be presented (Column 11, lines 31-65, Column 12, lines 44-67, Column 13, lines 1-6, 48-57).

4. Regarding Claim 1, the applicant argues that independent claim 1 recites "receiving and decrypting characteristics of a viewer, the content, and viewing opportunities and as discussed above Zigmond does not teach or disclose the limitations of claim 1 (Page 24). The applicant further argues that Aras does not decrypt the characteristics and that the section provided for Aras reveals a description of Audio Visual Material (AVM) and Audio Visual Information (AVI) (Page 24). Note: AVI is Audio Visual Identifier as cited from Aras (Column 7, lines 32-33).

In response to the arguments, the examiner assumes the applicant refers to the receiving of characteristics of a viewer; the content and viewing opportunities discussed for claims 48 and 49. Zigmond does disclose this limitation receiving characteristics of a viewer (Column 11, lines 31-55, Column 12, lines 15-32, Column 13, lines 48-47, Figure 5, 83). See above response. Aras discloses decrypting characteristics of a viewer which can include universal codes and can include information for the targeting audience including contents for general viewing, parental guidance or restricted (Column 6, line 67, Column 7, lines 1-64, Column 10, Table 2, Column 13, lines 53-58, Column 14, lines 1-7).

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5. The objection to Claim 9 will remain until the applicant's specification is amended to include the specifically detailed information in the objection. The original claims filed included these limitations. The applicant's specification should not include any new matter.

The examiner would also like to note that the Patent and Trademark Office has taken Wikipedia off its acceptable research sources.

6. Claim 33 is argued that a comma is in the correct position and that a reference clock includes a Digital Video Broadcast (DVB). In response to the applicant's arguments, the examiner would like to point out that a DVB includes a reference clock. A reference clock does not include a DVB. See rejection below.

### ***Specification***

7. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required:

Claim 9 is not in the specification, specifically: "a smart card including an operating system allows multiple independent applications, one or more grant/deny type servers accessible on a network, one or more ticket server systems accessible on a network."

***Claim Rejections - 35 USC § 112***

8. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

9. Claim 33 is rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

Claim 33 recites that "reference clock including...a DVB, a time date table..."

Applicant's specification discloses that the reference clock includes a DVB Time-Date-Table (Page 62, lines 10-13, Page 66, lines 22-27). The specification does not disclose a reference clock including a DVB.

***Claim Rejections - 35 USC § 102***

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States



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only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

11. Claims 48-53 are rejected under 35 U.S.C. 102(e) as being anticipated by Zigmond et al (US 6,698,020 and hereafter referred to as "Zigmond").

Regarding Claim 48, Zigmond discloses a method of information a receiver connected to one or more broadcast networks of a content targeting opportunity and in response, the receiver selecting and displaying a version of content from a plurality of versions of content (Figure 4, Figure 5, Figure 6), the method comprising the steps of: receiving and storing characteristics of a viewer (Column 11, lines 31-49, Column 12, lines 15-32, Figure 5, 83), the content (Column 12, lines 15-32, Figure 5, 83), and viewing opportunities (Column 12, lines 44-67, Column 13, lines 1-6, Figure 5, 83, Column 11, lines 13-30), determining which versions of content are physically accessible to the receiver (Figure 5, 86, Column 8, lines 7-10) and which versions of the content the receiver is permitted to the access (Column 13, lines 48-57); performing an opportunity matching process to determine which accessible and permitted version of the content match the viewer, viewing opportunity and selection of content characteristics (Column 9, lines 26-30, Column 10, lines 48-67, Column 11, lines 13-19, Column 13, lines 7-39, 48-58, Figure 6, 110; displaying the determined versions of content for viewing and wherein the opportunity is received (Figure 6, 16, Column 13, lines 7-39); storing results of the viewing of the determined versions of content (Figure 5, 61, Column 9, lines 39-55); and reporting the results of the version of content displayed for viewing to a reporting facility (Column 9, lines 21-55, Figure 5, 61).

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Regarding Claim 49, Zigmond discloses a method of selecting and acquiring a version of content from a plurality of versions of content for subsequent targeted content viewing opportunities by a receiver connected to one or more broadcast networks (Figure 4, Figure 5, Figure 6); the method comprising the steps of: receiving and storing characteristics of a viewer (Column 11, lines 31-49, Column 12, lines 15-32, Figure 5, 83), the content (Column 12, lines 15-32, Figure 5, 83), and viewing opportunities (Column 12, lines 44-67, Column 13, lines 1-6, Figure 5, 83, Column 11, lines 13-30), determining which versions of content are physically accessible to the receiver (Figure 5, 86, Column 8, lines 7-10) and which versions of the content the receiver is permitted to the access (Column 13, lines 48-57); performing an opportunity matching process to determine which accessible and permitted version of the content match the viewer, viewing opportunity and selection of content characteristics (Column 11, lines 31-65, Column 13, lines 48-57);

Making sufficient space available on local storage (Column 15, lines 17-22); and if permission is available to use the local storage accessible to the receiver with characteristic suitable for real-time playback with predicted content access latency characteristics or at the precise time playing predictable content (Column 15, lines 52-65); acquiring and storing the content on the local storage (Figure 5, 86, Column 15, lines 24-65).

Regarding Claims 50, 51, 52 and 53, Zigmond discloses a method of targeting of content presentation to individual users in a broadcast communications network

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including management and reporting of the content presentation (Figure 5, 61, Column 9, lines 5-61), the method comprising the steps:

Means for receiving from content providers (Column 7, lines 1-10), a plurality of potential versions of content for presentation to users (Column 13, lines 48-57); means for sending to a plurality of receivers operated by the individual users (Figure 1, Column 7, lines 50-61), a plurality of versions of content, content characteristics describing each of the versions of content, display opportunities describing when each of the versions of content is to be presented (Column 11, lines 31-65, Column 12, lines 44-67, Column 13, lines 1-6, 48-57), and user characteristics describing users to whom each of the versions is to be presented (Column 11, lines 31-65, Column 12, lines 44-67, Column 13, lines 1-6, 48-57);

Means for receiving from a user, requests for viewing and other actions triggering the present of the sent version of content (Column 9, lines 25-31, Column 11, lines 13-20);

Means for selecting, using information known about the user, the request and the actions received from the user, versions of content from the sent versions of content to present to the user;

Means for presenting to a user a version of content selected from the sent plurality of version of content based on information known about the user (Column 11, lines 31-65, Figure 6, 116); and

Means for recording and reporting a fact that the versions of content were presented to the user (Column 9, lines 21-55, Figure 5, 61).

***Claim Rejections - 35 USC § 103***

12. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

13. Claims 1-21, 24-28, 30, 32, 35, 36, 39, 40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras et al (US 5,872,588 and hereafter referred to as "Aras").

Regarding Claim 1, Zigmond discloses a method of informing a receiver connected to one or more broadcast networks of a content targeting opportunity (Figure 4) and in response, the receiver selecting and displaying a version of content from a plurality of versions of content (Column 13, lines 48-58), the method comprising the steps of: receiving characteristics of a viewer (Column 11, lines 31-55, Column 12, lines 15-32, Column 13, lines 48-47, Figure 5, 83), the content (Column 12, lines 15-32, Figure 5, 83), and viewing opportunities (Column 9, lines 26-30, Column 12, lines 44-67, Column 13, lines 1-39, Figure 5, 83, Column 11, lines 13-30); identifying physically accessible versions of the content the receiver is permitted to access (Column 13, lines 48-58, Column 10, lines 59-60); performing an opportunity matching process to determine which accessible and permitted versions of the content best match the viewer, viewing opportunity and selection of content characters and records of prior

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content viewing (Column 9, lines 26-30, Column 10, lines 48-67, Column 11, lines 13-19, Column 13, lines 7-39, 48-58); displaying the determined version of content for viewing when the content targeting opportunity is received (Figure 6, 116); recording results of the displayed version of content (Figure 5, 61, Column 9, lines 39-55); and reporting the results of the version of content displayed for viewing to a reporting facility (Column 9, lines 21-55, Figure 5, 61).

Zigmond is silent on decrypting characteristics of a viewer, a selection of content, and viewing opportunities. Aras discloses decrypting characteristics of a viewer, a selection of content, and viewing opportunities (Column 6, lines 67, Column 7, lines 1-30, 61-64, Column 10, Table II Column 13, lines 53-58, Column 14, lines 1-7).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify to Zigmond to include (Column 6, lines 67, Column 7, lines 1-30, 61-64, Column 10, Table II Column 13, lines 53-58, Column 14, lines 1-7) as taught by Aras in order to provide content coding so that accurate information can be collected on the viewers to target content such as advertisements (Column 3, lines 7-27) as disclosed by Aras and so that the content coding has the benefit of secure transmission as the information sent is used by the home stations to collect behavior information.

Regarding Claim 2, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses performing a content matching process to determine which of the accessible and permitted versions of the content best match the viewer, viewing opportunity and content characteristics and records of prior content viewing (Figure 5,

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Figure 6, 110, Column 11, lines 41-65, Column 12, lines 15-32, 44-67, Column 13, lines 1-39), determining if a permission is available to use a storage accessible to the receiver (Figure 5, 86, Column 10, lines 58-60, Column 13, lines 48-58), the storage having characteristics suitable for real-time playback with predictable content access latency characteristics or at the precise time playing predictable content (Column 15, lines 52-65); deleting stored content that is less suitable than the determined version of content if sufficient storage space is not available (Column 15, lines 17-23); and storing the determined version of content on the storage (Column 15, lines 17-25).

Regarding Claim 3, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the content targeting opportunity is provided in response to an invocation of function or group of one or more functions of the receiver (Figure 6, 110, Column 11, lines 31-65, Column 13, lines 48-58).

Regarding Claim 4, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses a type of the version of content is determined in accordance with characteristics of the viewing opportunity (Column 13, lines 7-26, Column 13, lines 48-58).

Regarding Claim 5, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the characteristics of the viewing opportunity and content cause the opportunity matching process to determine the version of content in accordance with timing and the version of content determined for prior content targeting opportunities (Column 13, lines 7-26, 48-58, Column 15, lines 35-40).

Regarding Claim 6, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the characteristics of the viewing opportunity and content cause the opportunity matching process not to determine any version of content based on timing and content determined for prior content targeting opportunities (Column 11, lines 31-65, Column 12, lines 44-67, Column 13, lines 1-26, 48-58, Column 15, lines 35-40).

Regarding Claim 7, Zigmond and Aras disclose all the limitations of Claim 2. Zigmond discloses the opportunity matching process and the content matching process are performed within one or more components of the receiver (Column 13, lines 7-26, Figure 6, 110).

Regarding Claim 8, Zigmond and Aras disclose all the limitations of Claim 7. Zigmond discloses the viewer characteristics are stored in whole or in part within one or more components of the receiver (Figure 5, 83).

Regarding Claim 9, Zigmond and Aras disclose all the limitations of Claim 8. Zigmond disclose the step of storing the characteristics, performing the opportunity matching process and/or the content matching process, recording the viewing results, and reporting the viewing results are performed and managed on one or more facilities selected an interactive application system such making purchases or interacting with programming (Figure 5, Figure 6, Column 13, lines 7-26).

Regarding Claim 10, Zigmond and Aras disclose all the limitations of Claim 9. Aras discloses the characteristics are encrypted prior to transmission and decrypted after transmission (Column 6, lines 67, Column 7, lines 1-30, 61-64, Column 8, Table II Column 13, lines 53-58, Column 14, lines 1-7).

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Regarding Claim 11, Zigmond and Aras disclose all the limitations of Claim 10. Aras discloses that the encryption and decryption are performed on any of the facilities or on an interactive application system or a system, which allows for interaction for a program such as shopping (Column 6, lines 67, Column 7, lines 1-30, 61-64, Column 8, Table II Column 13, lines 53-58, Column 14, lines 1-7).

Regarding Claim 12, Zigmond and Aras disclose all the limitations of Claim 2. Zigmond discloses the selection of content, viewing opportunities and viewer characteristics comprise descriptors, the descriptors include variable and extensible characteristics (Column 11, lines 31-65, Column 10, lines 59-64).

Regarding Claim 13, Zigmond and Aras disclose all the limitations of Claim 2. Zigmond discloses that all or a portion of algorithms of the opportunity matching processes and content matching processes for matching the content, viewer and viewing opportunity characteristics are transmitted as one of the viewing opportunity or content characteristics or advertising selection criteria (Column 11, lines 31-65, Figure 5, Figure 6, 110).

Regarding Claim 14, Zigmond and Aras disclose all the limitations of Claim 9. Zigmond discloses viewer characteristics are independent available on the facilities, the viewer characteristics being selected from: a postal code or address information or geographical location based on city, neighborhood, or street address, a viewer channel selection and an electronic program guide (EPG) display profile (Column 10, lines 48-67, Column 11, lines 13-30); prior purchases (Column 10, lines 48-67, Column 11, lines 13-30) including television pay per view movies (as the user can watch these movies).



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(Column 10, lines 48-65, Column 6, lines 18-22) and a viewer content filtering criteria, including VCHIP settings and ratings or parental lock codes, wherein the VCHIP locks out programming based on program rating (Column 10, lines 48-67, Column 11, lines 13-30).

Regarding Claim 15, Zigmond and Aras disclose all the limitations of Claim 9. Zigmond discloses that content matching process and opportunity matching process are performed within the facilities, so that only a subset of the characteristics is retrieved from the facilities and only a subset of the determination of the content and opportunity matching process is returned without retuning any of the characteristics or matching a content based on an opportunity such as changing a channel and matching an advertisement or targeted advertisement based on characteristics of the viewer or opportunity or selection of content and returning the advertisement that is determined from the matching processes without returning any of the characteristics (Figure 5, Figure 6).

Regarding Claim 16, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses that content characteristics comprise: a maximum number of repetitions (Column 13, lines 7-46, Column 14, lines 40-47, Column 8, lines 25-28), a minimum amount of time between shows, a maximum number of incomplete repetitions or the amount of times an advertisement can be viewer and number of times a commercial has been changed during a commercial (Column 13, lines 7-46), a time window for usage (Column 13, lines 59-67, Column 14, lines 1-12), technical requirements for usage of the content on the receiver (Figure 6, 110, Column 13, lines

7-47, Column 14, lines 1-12). Aras discloses content characteristics such as owners of the contents (Table II, Column 10) and a sequence number for content containing multiple instances of content within a sequence (Column 8, Table I).

Regarding Claim 17, Zigmond and Aras disclose all the limitations of Claim 13. Zigmond discloses the version of content is selected in response to an invocation of a function on the receiver, the function being selected from one of: starting and stopping a communication session or channel change (Column 9, lines 21-32, Column 13, lines 7-26).

Regarding Claim 18, Zigmond and Aras disclose all the limitations of Claim 17. Zigmond discloses the content targeting opportunity is provided in response to one of a plurality of advertising slots being available on a plurality of channels, the advertising slots being related for the purposes of sharing the advertising on each channel and for managing and targeting the advertising opportunities (Column 11, 31-65, Figure 5, Figure 6, Figure 2a, Figure 2b).

Regarding Claim 19, Zigmond and Aras disclose all the limitations of Claim 18. Zigmond discloses the targeting opportunity is provided in response to one of a plurality of advertising slots available on a single channel (Column 3, lines 7-21, Figure 2a, Column 13, lines 7-35).

Regarding Claim 20, Zigmond and Aras disclose all the limitations of Claim 16. Zigmond discloses the viewing opportunity and the content characteristics are based on a combination of the informing the receiver of the content targeting opportunities, the displayed version of content, a frequency with which content targeting opportunities are

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provided, a time at which content targeting opportunities are provided and a time separating the provision of the content targeting opportunities (Column 10, lines 36-67, Column 11, lines 1-65, Column 13, lines 7-46) which include the version of content watched (Column 13, lines 48-58), the frequency at which a viewer is watching the targeting opportunities and performing actions (Column 9, lines 21-26, Column 13, lines 7-26), a time at which content targeting opportunities are provided (Column 11, lines 15-17) and a time separating the provision of the content targeting opportunities or separating the targeting opportunities of content to the viewer based on time (Column 11, lines 15-17) which are used to determine the selection of content characteristics and viewing opportunity (Figure 6, 110).

Regarding Claim 21, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses a direct to home satellite broadcasting system (DTH), a cable television network (Column 7, lines 1-12), and a telephone network (Column 7, lines 65-67).

Regarding Claim 24, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the receiver is selected from a digital set top cable or satellite receiver or household ad insertion device (Figure 3, Figure 4, 60, Column 7, lines 38-49).

Regarding Claim 25, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses that the receiver handles multiple content streams simultaneously, allowing the acquisition of the characteristics and the versions of content simultaneously with the viewing of the versions of content (Column 12, lines 1-32, Figure 4).

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Regarding Claim 26, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the receiver acquires versions of content using viewing facilities when the receiver is not being used for view (Column 18, lines 7-28).

Regarding Claim 27, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the versions of content are selected from content on a plurality of services having synchronized start and end times of the content (Column 16, lines 20-30, Column 13, lines 29-38).

Regarding Claim 28, Zigmond and Aras disclose all the limitations of Claim 27. Zigmond discloses the versions of content are selected from streams of alternative content used by a plurality of services as a source of content alternatives and the scheduling of alternative content and the services allow for sharing content among a plurality of service (Figure 5, 86, Column 15, lines 17-65).

Regarding Claim 30, Zigmond and Aras disclose all the limitations of Claim 28. Zigmond discloses a bandwidth is available for services, which are temporarily off the air on a regular or occasional basis (Column 18, lines 7-21).

Regarding Claim 32, Zigmond and Aras disclose all the limitations of Claim 28. Zigmond discloses that the versions of content are transmitted faster than real time using methods other than primary content transfer mechanism (Column 16, lines 44-56).

Regarding Claim 35, Zigmond and Aras disclose all the limitations of Claim 2. Zigmond discloses the matching is based on geographical locations and the receiver's knowledge of its location based on technology for implementing black-outs within the

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receiver, though matching content to each area within the black out pattern (Column 10, lines 48-58).

Regarding Claim 36, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses recording and reporting the viewer's inputs (Column 9, lines 39-55). Zigmond discloses on viewer's inputs are used to calculate a probability of which one of the plurality of viewers within a household was viewing the displayed version of content at a given time (Column 9, lines 65-67, Column 10, lines 1-3).

Regarding Claim 39, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses the viewing of versions of content is deemed uninterrupted, regardless of the action taken by the viewer on inputs to the receiver (Column 13, lines 29-39).

Regarding Claim 40, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses that versions of content is being recorded is used as a criteria for matching the version of content to the content targeting opportunity (Figure 5, 86, Column 14, lines 1-12).

14. Claims 22 and 23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 21 above, and further in view of Djupsjobacka et al (US 2003/0022643 and hereafter referred to as "Djup").

Regarding Claim 22, Zigmond and Aras disclose all the limitations of Claim 21. Zigmond discloses the characteristics can be transmitted via the Internet (Column 7, lines 15-22). Aras discloses a transmission protocol for transmitting the characteristics

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includes Moving Picture Experts Group (MPEG) transport streams (Column 13, lines 44-45), vertical blanking interval (Column 13, lines 30-33), and private data of the MPEG streams (Column 13, lines 44-45). Zigmond and Aras do not explicitly disclose DVB transport streams, Transmission Control Protocol/Internet Protocol (TCP/IP) transport streams directly within the networks as defined within a specification selected from a DVB, or private data fields within a DVB Event Information Table (EIT). Djup discloses DVB transport streams (Page 4, paragraph 0043, Page 1, paragraph 0001), TCP/IP transport streams directly within the networks as defined within a specification selected from a DVB (Page 2, paragraphs 0011- 0013, 0017), or private data fields within a DVB EIT (Page 4, paragraph 0043, 0045). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Zigmond and Aras to include a transmission protocol for transmitting information includes DVB transport streams (Page 4, paragraph 0043, Page 1, paragraph 0001), TCP/IP transport streams directly within the networks as defined within a specification selected from a DVB (Page 2, paragraphs 0011- 0013, 0017), or private data fields within a DVB EIT (Page 4, paragraph 0043, 0045) as taught by Djup in order to transmit the program using fewer bits and to transmit signals for several different services (Page 1, paragraphs 0003, 0004) as disclosed by Djup.

Regarding Claim 23, Zigmond, Aras and Djup disclose all the limitations of Claim 22. Zigmond discloses sending ad selection criteria, which include characteristics and rules or algorithms, and processes which sent to the user via satellite (Column 7, lines 1-12). Aras discloses sending data in MPEG via satellite (Column 13, lines 44-45).

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Djup discloses transmitting data transmissions via DVB (Page 4, paragraph 0043, Page 1, paragraph 0001).

15. Claim 29 is rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 28 above, and further in view of Arsenault et al (US 7,075,945 and hereafter referred to as "Arsenault").

Regarding Claim 29, Zigmond and Aras disclose all the limitations of Claim 28. Zigmond and Aras are silent on a bandwidth is available from services, which are not airing the content though simultaneous substitution requirements. Arsenault discloses a bandwidth is available from services, which are not airing the content though simultaneous substitution requirements (Column 5, lines 43-67, Column 6, lines 1-10, Column 16, lines 46-53, Abstract). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Zigmond and Aras to include a bandwidth is available from services, which are not airing the content though simultaneous substitution requirements (Column 5, lines 43-67, Column 6, lines 1-10, Column 16, lines 46-53, Abstract) as taught by Arsenault to maximize the number of programs possible (Column 2, lines 47-59, Column 16, lines 46-53) as disclosed by Arsenault.

16. Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 28 above, and further in view of Eldering et al (US 20040148625 and hereafter referred to as "Eldering").

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Regarding Claim 31, Zigmond and Aras disclose all the limitations of Claim 28. Zigmond discloses versions of content are available via the Internet (Column 7, lines 15-22). Zigmond and Aras are silent on versions of content are available from a switched network including Digital Subscriber Line (xDSL). Eldering discloses that versions of content are available from a switched network including xDSL (Page 6, paragraph 0090). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Zigmond and Aras to include versions of content are available from a switched network including xDSL (Page 6, paragraph 0090) as taught by Eldering in order to provide numerous methods to transmit data to the set top box so that all subscribers can gain access to targeted commercials (Page 6, paragraph 0090, Page 1, paragraph 0012) as disclosed by Eldering.

17. Claim 33 is rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 32 above, and further in view of Kataoka et al (US 6,282,209 and hereafter referred to as "Kataoka").

Regarding Claim 33, Zigmond and Aras disclose all the limitations of Claim 32. Zigmond discloses the start point to switching to an alternative content stream is based on timing (Column 15, lines 45-65). Zigmond and Aras are silent on the timing relative to a reference clock, the reference clock including: a time of day reference time stream available to the receiver, a Digital Video Broadcast (DVB), a time date table (TDT), a MPEG presentation time stamp (PTS) and a MPEG display time stamp (DTS). Kataoka discloses timing relative to a reference clock, the reference clock including: a time of



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day reference time stream available to the receiver (Column 5, lines 3-10, Column 3, lines 1-16), a DVB (Column 2, lines 65-67, Column 3, lines 1-29), TDT (Column 5, lines 3-10, Column 3, lines 1-16), a MPEG PTS (Column 4, lines 66-67) and a MPEG DTS (Column 4, lines 66-67). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Zigmond and Aras timing relative to a reference clock, the reference clock including: a time of day reference time stream available to the receiver (Column 5, lines 3-10, Column 3, lines 1-16), a DVB (Column 2, lines 65-67, Column 3, lines 1-29), TDT (Column 5, lines 3-10, Column 3, lines 1-16), a MPEG PTS (Column 4, lines 66-67) and a MPEG DTS (Column 4, lines 66-67) as taught by Kataoka in order to provide download a segment or with preciseness in a digital broadcasting system (Column 1, lines 9-16) as disclosed by Kataoka.

18. Claim 34 is rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 32 above, and further in view of Kalluri et al (US 5,937,331 and hereafter referred to as "Kalluri").

Regarding Claim 34, Zigmond and Aras disclose all the limitations of Claim 32. Zigmond discloses that the start point for switching to an alternative content stream is based on an amount of time elapsed from a detectable event in a video stream, the detectable event including trigger mechanisms or data elements that are used as trigger mechanisms within analog or digital stream such as triggering signal during the VBI of a television signal (Column 15, lines 45-55). Zigmond and Aras are silent on the detectable event including a Dual Tone Multi-frequency (DTMF) signal. Kalluri

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discloses that the start point for switching to an alternative content stream is based on an amount of time elapsed from a detectable event in a video stream, the detectable event including DTMF signal (Column 7, lines 55-59). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Zigmond and Aras to include the start point for switching to an alternative content stream is based on an amount of time elapsed from a detectable event in a video stream, the detectable event including DTMF signal (Column 7, lines 55-59) as taught by Kalluri in order to provide numerous trigger mechanisms for different systems to inset triggers (Column 7, lines 47-59) as disclosed by Kalluri.

19. Claims 37, 38 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zigmond in view of Aras as applied to claim 1 above, and further in view of Eldering et al (US 6,457,010 and hereafter referred to as "Eldering2").

Regarding Claim 37, Zigmond and Aras disclose all the limitations of Claim 1. Zigmond discloses that there is an optional monitoring which collects information related to the advertisements and the information is sent to a reporting facility (Column 9, lines 21-55). Zigmond and Aras are silent on a level of detail of reporting is based on a permission the viewer has agreed to and the level is controlled within the receiver. Eldering2 discloses a level of detail of reporting is based on a permission the viewer has agreed to and the level is controlled within the receiver or agreeing to allowing access to the information from the receiver (Column 2, lines 55-64). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to

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modify Zigmond and Aras to include level of detail of reporting is based on a permission the viewer has agreed to and the level is controlled within the receiver (Column 2, lines 55-64) as taught by Eldering2 in order to provide allow the users to be targeted with accurate ads (Column 2, lines 55-64) as disclosed by Eldering2.

Regarding Claim 38, Zigmond, Aras and Eldering2 disclose all the limitations of Claim 37. Eldering2 discloses the permission was obtained by a reduction of price in the serves, a credit towards specific services or a direct payment (Column 2, lines 55-64).

### ***Conclusion***

20. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.


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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Farzana E. Hossain whose telephone number is 571-272-5943. The examiner can normally be reached on Monday to Friday 8:00 am to 4:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christopher Kelley can be reached on 571-272-7331. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

FEH  
March 21, 2007

  
SCOTT E. BELIVEAU  
PRIMARY PATENT EXAMINER